

### **IN THE SPECIFICATION:**

The paragraph beginning at page 7, line 4 has been amended as follows:

Figure 2 schematically shows a layout for regulation of the focal spot position. Only a section of half of the X-ray tube 1 from Figure 1 is shown. The electron beam 7 deflected by the deflection coils 9 is depicted in two different, alternative deflection directions, once as a solid line and once as a dashed line. As a result, the electron beam 7 strikes the anode 5 at two different, alternative focal spot positions 11. Depending on focal spot position 11, the anode 5 emits a differently angled X-ray beam 13 with a different spatial position, whereby Figure 2 only shows the different position and not the different direction. Figure 2 shows that the different deflection of the electron beam 7 results in a displacement of the position of the X-ray beam 13.

The paragraph beginning at page 7, line 13 has been amended as follows:

The X-ray beam ~~[[s]]~~ 13 leaves the X-ray tube 1 and pass through the aperture 15. The aperture 15 traverses the optical path between anode 5 and the object or patient to be examined or treated and shields other emission directions for the X-ray beam 13. It thereby has such a large cross-section that the direction and position of the penetrating X-ray beam 13 can still be modified.

The paragraph beginning at page 8, line 13 has been amended as follows:

The output signal of the comparator 21 is fed to a regulator 23. The regulator 23 receives, via another input, the target value input 25, a target value signal, which reflects the desired position of the X-ray beam 13 in relation to the photo-detectors 17, 19. Depending on the adherence or the deviation of the output signal of the comparator 21 from the target value, the regulator 23 gives a consistent or changed

output signal. This is ~~strengthened~~ amplified by a coil current source 27 and ~~approaches~~ is supplied to the deflection coil 9 as coil current.

The paragraph beginning at page 8, line 20 has been amended as follows:

The depicted layout ~~generates~~ operates as a regulation circuit in that the regulator 23 changes the coil current as the regulation parameter, ~~the dependency of~~ which results in a changed deflection of the electron beam 7. This changes the regulation variable, namely the focal spot position 11 of the electron beam 7 on the anode 5. The regulation variable cannot be obtained directly, but rather only indirectly via the position of the X-ray beam 13 through the photo-detectors 17, 19. This indirectly obtained regulation control variable is fed to the regulator 23. With this, the regulation circuit is closed, since the indirectly attained regulation variable also reliably reflects the actual focal spot position 11. The time constant, with which the regulation circuit works, is determined only from the time constants and response times of the components of the regulation circuit itself. Above all, the aperture time through the photo-detectors 17, 19 should be taken into account and should be as short as possible. The comparator 21 operates virtually without a time delay; the regulator 23 and the coil current source 27 should operate sufficiently quickly so as to be compatible.